

### Voice Mail as an Adherence Tool

Adherence to an antiretroviral regimen is critical to successful treatment for people with HIV disease. Multiple tools to improve adherence have been developed, including questionnaires, counseling, alarm devices, and others. These tools tend to be time consuming for patient and staff, and require the use of additional resources at the care facility. We have developed a tool to assist in adherence that uses minimal resources, minimal time, and works with many patients. When starting a new antiretroviral regimen, the patient is asked to call the office voice mail each time a dose is taken. This takes advantage of the fact that most patients do have phones, and all care facilities have voice mail.

A patient new to treatment faces many challenges. He or she must make changes in behavior to assure that medications are taken correctly. There is the challenge of learning to manage side effects, and the emotional burden of knowing that medications are necessary to treat a condition for which there is no cure. Issues of disclosure may arise, and the role of significant others, friends, and family may still be uncertain.

The treatment-experienced patient also faces challenges. He or she may have had multiple treatment failures and now has limited options. Adherence is critical. This patient may come to a new regimen dreading a repeat of the past – including poor adherence, multiple side effects, and a nagging feeling that nothing will work. For the patient with a long HIV history, these feelings may be complicated by problems with short-term memory and concentration.

Our approach to improving adherence is simple. Patients starting a new regimen are asked to call the office voice mail each time a dose is taken. Our voice mail indicates the time of the call. The patient is asked to state his or her name and say that the dose has been taken. If the patient has a concern or question, he or she may request a call back from the nurse. As the patient becomes more confident in his or her ability to take each dose, and makes the changes in behavior necessary to assure adherence, the frequency of calls may decrease. The patient and care provider decide together when the program is no longer necessary. This is individualized for each patient.

This technique has proved successful for both treatment naïve and treatment experienced patients. There is a heightened feeling of connection on the part of the patient. He or she is comfortable knowing that questions will be answered and problems addressed quickly. The patient feels more of a sense of active partnership with the provider. For the patient new to treatment, this may be sensed as a support system. For the experienced patient, it represents an additional safeguard if short-term memory is a problem. For all patients, in this age of cell phones everywhere, the act of making a call is non-threatening and does not make them stand out.

This technique is very helpful to providers as well. It allows for problems to be addressed in real time. If a call does not come in, the patient is contacted. The reason for the missed dose is explored and actions are taken. The patient, who experiences nausea with the morning dose and so has not taken it, can be counseled on side effect management. The patient who finds an evening dose inconvenient may be counseled on alternative timing. The voice mail system eliminates the scenario of the patient coming in two weeks after starting a regimen, stating that he or she took only half of the prescribed dose for the last ten days due to nausea.

For our facility, this technique has also been an efficient use of resources. There are no additional forms to complete and no additional personnel required. A list is maintained at the phone station. As voice mail is checked frequently during the day, there is no additional task to complete. Any person may check the voice mail, and simply check off the patient messages on the list. If an expected message is not received, or the message includes a request for a call back, the nurse is notified and the patient contacted. The result of the patient contact is documented, as any other patient contact would be.

Using voice mail as an adherence tool has been successful at our facility. Many patients stay on the system for eight to twelve weeks, and are assured that they may go back to the system at any time if problems arise. Our treatment-experienced patients have benefited tremendously. Even after years of treatment failures, patients utilizing voice mail have seen a marked decrease in viral load, and an increase in CD4 counts.

While no intervention is appropriate to all patients, this technique may be used for a wide variety of patients, both treatment naïve and treatment experienced. The system takes advantage of two things that are commonly found everywhere – voice mail at the care facility and patients with cell phones. In an era of cost consciousness, this technique requires minimal personnel time and resources. It provides a reassuring connection to care providers for patients. Perhaps most importantly, it allows providers to address adherence issues and side effects in real time, which increases the probability of successful treatment.